

London, 12th. February, 1839.

Dear Doctor:

I have been all day among Lambart's plants, and was a little while this evening with Bentham. He is correcting the proof of his paper on *Stylosanthes* for the *Linnean Transactions*, and has just been examining *Chapmannia* in connexion. He thinks it a good genus, tho' near *Stylosanthes*, and has added a note about it to his paper, as well as the character of the fruit from your letter to me. But what pleased Bentham most of all was that he found good fertile flowers on the very specimen, which you had searched in vain for them. Now that he has found them they are conspicuous enough, and the wonder is how we happened not to find them, when they are just such things as we were looking for. I will send Bentham's paper as soon as I can get it.

Let me not forget to mention, that as yet, I find nothing of the parcel of plants you mention as having been sent with the books to Mr. Putnam. The clerk is trying to find it, but so far without success. Was it actually sent? I hope it will not be lost.

For fear of any accident I give you some of the most important notes from Pursh, so far. — His

Jussiaea subacaulis = *Knuthera heterantha*, Nutt.
Agrimonia parviflora & *marcolana* are the same (the plant from Short, with slender leaflets serrate with many teeth). The other one in your herb, with short leaflets with a few coarse teeth or lobes is consequently a new species. My notes upon other Rosaceae are interesting but I will not go into them now.

Helianthemum rosmarinifolium, Pursh (spec. Englin) is not *H. Canad.* as you supposed, but *H. polifolium*!

I have been looking at Tilia's. After I have examined those at the British Museum, I will give you some notes. I have been settling Linnean Asclepiadeae, and will presently give you notes on most of the old species. It is slow work, but very necessary.

Pentstemon Bradburii seems to be the *P. Murrayanum* Hook, & is it not also *P. tubae florum*, Nutt. Arkans. ? Bentham is inclined to study our *Pentstemonis* in a month or two, if you can get Nuttall's of the last collection for him. Pray get your set and send them out. It should be done soon, as Bentham goes to the continent in the summer.

Oxytropis argentata, Pursh. This & the other have been strangely mixed up in Lambart's herb., and it was no easy matter to see through it.

Chapman's new Micromeria = M. Brownei! Michx. got it in Florida!

The substance is this. *Astragalus melanocarpus* Nutt. in *trans.*
Cat. is in *Nutt. Lamb.* but is not published by Pursh.
Oxytropis argentata "Clark's River" &c. is merely *O. Lambertii*.
- is not *Astrag.* *melanocarpus*, and is not *Astrag.* *argentatus*, Willd.
& Pallas, for I have compared them.

Psoralea esculenta. Pursh speaks only of - specimens from Lewis.
Now Lewis' spec. is in mature fruit. His figure is taken from
Nuttall's specimens on next sheet, & his description applies
partly to this subcaulescent form, and partly to the other
(which is the *P. brachiata*, Hook.) - (But as you suspected the
two are the same, and Pursh is quite right in uniting them,
Nuttall surely can't say his *P. esculenta* is not Pursh's, when
Pursh's figure is taken from his own specimen!)

Psoralea cuspidata, Pursh, suppl. which we somehow overlooked
until it was too late is not a form of *esculenta*, as you
guessed, but *P. cryptocarpa*, of the *Flora*.

Thursday evening. -

Two more days at Lambeth; and not done yet, though I
have worked very hard. But I will go on.

Pentstemon Bradburii Pursh! = *Murryanum*? = *tubaeformis* Nutt.?

I have seen *Galvesia punctata* R. & Par. - It has not much the
appearance of Nuttall's species, which may be a new genus. I have a
flower or so.

Hymenopappus tenuifolius! I have reasons for thinking that Hooker's
H. lilifolius is not different.

Senecio pauciflorus! = dwarf *S. aureus*. *S. "gracilis"* Schlegelii "an agnus?"

Artemisia canadensis, the spec. is *Eupatorium foniculoides*!

Eupatorium amoenum! = our *purpureum*

"*verticillatum*! = *purpureum* var.

"*album*! no, *semilif.* & a bit of something else

"*tenuifolium*! = *rotundifolium*

"*hyssopifolium*! = of Torr. not of D.C.

"*linearifol.*! 2 species mixed.

What think you of our *Brasenia* from New Holland?

Clematis holosericea Pursh! = *C. Drummondii*, nobis!

"*Catesbyana*! = *Plukenetii* D.C. (V. sp. in hb. Banks) = our little

one from Le Conte - a bit not described from. Distinct from

virginica. Very short tails, though perhaps they elongate!

"*cordata*, Pursh! = *virginiana catesbyana*!

Orchis viriculata, Pursh! I am right!

"*dilatata*! - right also!

"*fuscescens*! = *habicola*

Friday

I have been to-day at the British Museum, studying
from the specimens of Plukenet, Catesby, Miller &c. &c. - the authority
for old Linnean species in *Ilex*, *Prinos*, *Eupatorium* &c. It is
slow and tedious work, and I will not have time to do so much
of it as I could wish.

Brown told me to-day about *Petalan-*
thera. It is *Cervallia*, *Lagasca*, Hook. Madrid, and very
probably this species even *C. sinuata*. It came from New Spain.

You will see Lindley is all astray about the genus and no
one knows its affinities even but Brown, *Lagasca* himself

refers it to *Brassicaceae*. It is true *Loaseae*. I was this
evening at Bentham's, and found he had a specimen of

C. sinuata from Hooker, collected by Bridges in Mexico, I
think.

I have asked Brown to give us some notes on the subject,
a generic character &c. that we may publish a little from
his own pen. I am to spend a day with him next week,

and I will try to get something out of him. He hinted to
me some days ago that he knew something about *Cynilla*

Hg. but I could not get it out of him. I'll try again.

He tells me he has a character to distinguish true *Rhexia*,
which has escaped Don, DeCandolle &c. We must find it

out. Bentham has given me his *Scrophularia*
Indiceae, and the three last parts of his *Labiata*: I have

bought the rest (£1.2.6.) and last evening we looked over his
H. Amor. specimens, and notes in his copy. He gave me

also the other day, the only published part of the "*Plantae Angel-*
inae" and a few other pamphlets. He is a liberal soul.

Wednesday 20th Feb 9.

I bought a copy of *Flora* for Bennett, the other
day, thinking it worth while to offer him something, as I

was taking up much of his time. To-day he gave
me a copy of the published part of the "*Plantae Garro-*
Rariores" - (£2.10 plain, is the publishing price) - an

invaluable work, containing very many notes and observations
on various genera &c. both by Brown and himself, which

it is quite necessary we should see. The notes I have
made for the last few days are not now before me,

so that I cannot now give you any remarks. There is
no one thing of very considerable importance, but much

small matter! By the way, let me say that
Bennett thinks that Brown thinks *Ronandrovia* to

be *Hydrophyllaceae*! Bentham would give something to

know this, but I shall keep it to myself. I have made out the remainder of Pursh's doubtful *Ararias* & *Stittania* from Herb. Banks. The parcel of Solidago's &c. sent to care of Mr. Putnam, I am glad to say, came to hand. It did not arrive until last week however.

Monday Morning, March 4, 1839

I have got so far behind in my botanical news that I despair of bringing up my arrears, and must leave very much for telling you in *proproa persona*, if we meet again. I fancy I have not very much new to ~~learn~~ learn on the Continent about microscopes and modes of working. I have seen much of all the best people here, last not least Valentine, who lives in the country, from whom I have derived much useful knowledge. He works to some account, which can't be said of most here, who tho' they have the best instruments in the world, don't turn them to any important account. As to Sullivan, tell him to have great patience. I can get him a capital single simple microscope by Ross for six guineas, but I want to get as useful one for him cheaper. So I shall wait till I have been on the continent I think. My plan is to purchase at Paris for him, where the low powers are good as can be, and supply a lens or two here. For an achromatic I shall ~~perhaps~~ have to give Ross, for an instrument that can be perfectly depended on, £30 - 35 pounds at least. I am going to take a test object with me, and after trying Ross' instruments, apply the very same test to those on the Continent. and if I am satisfied ~~buy~~ buy them both for Sullivan and myself, or I may ~~buy~~ buy portions there, and complete the instruments here. I am working at all this matter with great care, and you may assure Sullivan that he will lose nothing by the delay. I think, however I shall send him an instrument with single lenses from Paris. I have bought Mr. Sullivan. Hooker's *Flora Bor.-am.* 10 parts £7.17.6 to which add 5 per cent. = about £40. Also Hooker's *Leaves Plantarum* 2 vols. bound. £2.2.0. Please call for them at Wiley & Putnam's. You will have to pay duty.

Continued

Dr. J.

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Or rather let them charge the duty to me and I will render the whole account together to Mr. Sullivant. I shall send books by the London packet of the 15th inst. Also a small parcel by the Great Western, through Mr. Booth, but of all this I will apprise you in due time.

The Flora is announced in last Annals Nat. History handsomely. Putnam has got off 25 copies, and is going on upon the remainder, but complains that he cannot do as he wishes with it until he gets a volume completed. Balliere (the partner here) takes 3 copies only, and says the house at Paris will not take over b of a new work, but will order more if they get rid of these. Putnam is to send a half dozen to Balliere at Paris and order at the same time from a list of books that I give him to the amount. I shall get for there the later parts of DeCandolle for you and Sullivant, and so on. But give me a list of what you require in Chemicals and I will see if I can get them for you, I can surely do it if you particularly desire them.

I am obliged to break off, and get my breakfast. I wish to leave on Saturday and yet have not finished Brit. Museum. - I have 2 days more at Linnaea. Nat. at least, must have one with R. Br. - and a day at Gronovius' after I have done with Linnaeus.

I am awfully hard-worked. Adieu. Write often as you possibly can. -

Your affectionately
A. Gray

Our *Vesicaria brevistyla* = *V. grandiflora* Hook. and agrees well with the figure in Br. Mag.

"*V. grandiflora* B. is certainly diff. species; this alone has the long style; in *V. grandiflora* it is short enough. We made some rather bad work with them; otherwise it is all well.

Chapmaniana! exists in Bartrass's old collection here which you saw at Brit. Museum. and some other very lately published things